

Environmental Protection Agency

§ 86.000–15

(vii) The manufacturer must state at the time of Application for Certification, based on projected U.S. sales or projected production for U.S. sale, which families will be used to attain the required implementation schedule sales percentages for certification purposes.

(viii) A manufacturer cannot use one set of engine families to meet its intermediate useful life standards and another to meet its full useful life standards. The same families which are used to meet the intermediate useful life standards will be required without deviation to meet the corresponding full useful life standard.

(ix) The NO_x averaging program is not applicable for determining compliance with the standards of table A00–6.

(x) Compliance with composite standards shall be demonstrated using the calculations set forth in § 86.164–00.

(f) [Reserved]

(g)–(k) [Reserved]. For guidance see § 86.097–9.

[61 FR 54879, Oct. 22, 1996]

§ 86.000–15 NO_x and particulate averaging, trading, and banking for heavy-duty engines.

Section 86.000–15 includes text that specifies requirements that differ from § 86.094–15 or § 86.098–15. Where a paragraph in § 86.094–15 or § 86.098–15 is identical and applicable to § 86.000–15, this may be indicated by specifying the corresponding paragraph and the statement “[Reserved]. For guidance see § 86.094–15.” or “[Reserved]. For guidance see § 86.098–15.”.

(a)(1) Heavy-duty engines eligible for NO_x and particulate averaging, trading and banking programs are described in the applicable emission standards sections in this subpart. All heavy-duty engine families which include any engines labeled for use in clean-fuel vehicles as specified in 40 CFR part 88 are not eligible for these programs. For manufacturers selecting Option 1 Otto-cycle engine standards contained in § 86.005–10(f)(1), the ABT program requirements in § 86.004–15 apply for 2003 model year Otto-cycle engines, rather than the provisions contained in this § 86.000–15. Participation in these programs is voluntary.

(a)(2)–(b) [Reserved]. For guidance see § 86.094–15.

(c) [Reserved]. For guidance see § 86.098–15.

(d)–(i) [Reserved]. For guidance see § 86.094–15.

(j) *Optional program for early banking for diesel engines.* Provisions set forth in §§ 86.094–15 (a), (b), (d)–(i), and 86.098–15 (c) apply except as specifically stated otherwise in § 86.098–15 (j)(1)–(j)(3)(iii).

(j)(1)–(j)(3)(iii) [Reserved]. For guidance see § 86.098–15.

(k) *Optional program for early banking for Otto-cycle engines.* Provisions set forth in §§ 86.094–15(a), (b), (d)–(i), and 86.098–15(c) apply except as specifically stated otherwise in this paragraph (k).

(1) To be eligible for the optional program described in this paragraph (k), the following must apply:

(i) Credits are generated from Otto-cycle heavy-duty engines which have been certified using certification durability demonstration procedures which meet the criteria contained in § 86.004–26 and with deterioration factors calculated in accordance with § 86.004–28.

(ii) During certification, the manufacturer shall declare its intent to include specific engine families in the program described in this paragraph. Separate declarations are required for each program and no engine families may be included in both programs in the same model year.

(2) *Credit generation and use.* (i) Credits shall only be generated by 2000 and later model year engine families.

(ii) Except as provided in paragraph (k)(2)(iii) of this section, credits generated under this paragraph (k) may only be used for 2003 and later model year heavy-duty Otto-cycle engines subject to NO_x or NO_x plus NMHC standards more stringent than 4.0 g/bhp-hr. When used with 2003 and later model year engines, NO_x credits may be used to meet an applicable NO_x plus NMHC standard, except as otherwise provided in § 86.004–10(a)(1)(i)(C).

(iii) If a manufacturer chooses to use credits generated under this paragraph (k) for engine families subject to the NO_x standard contained in § 86.098–10 (4.0 g/bhp-hr) the averaging, trading, and banking of such credits shall be governed by the program provided in

§§ 86.094–15(a), (b), (d)–(i) and 86.098–15(c) and shall be subject to all discounting, credit life limits and all other provisions contained in §§ 86.094–15(a), (b), (d)–(i) and 86.098–15(c). In the case where the manufacturer can demonstrate that the credits were discounted under the program provided in this paragraph (k), that discount may be accounted for in the calculation of credits described in § 86.098–15(c).

(iv) For NO_x credits generated under this paragraph (k), a Std value of 2.0 grams per brake horsepower-hour shall be used in place of the current and applicable NO_x standard in the credit availability equation in § 86.098–15(c)(1).

(3) *Program flexibilities.* (i) NO_x credits that are banked under this paragraph (k) and not used as provided by paragraph (k)(2)(iii) of this section may be used without being forfeited due to credit age. The requirement in this paragraph (k)(3) applies instead of the requirements in § 86.094–15(f)(2)(i).

(ii) There are no regional category restraints for averaging, trading, and banking of credits generated under the program described in this paragraph (k) except if they are used under paragraph (k)(2)(iii) of this section. This applies instead of the regional category provisions described in the introductory text of § 86.094–15(d) and (e).

(iii) *Credit discounting.* (A) For NO_x credits generated under this paragraph (k) from engine families with NO_x FELs greater than 1.0 grams per brake horsepower-hour for oxides of nitrogen, a Discount value of 0.9 shall be used instead of 0.8 in the credit availability equation in § 86.098–15(c)(1).

(B) For NO_x credits generated under this paragraph (k) from engine families with NO_x FELs less than or equal to 1.0 grams per brake horsepower-hour for oxides of nitrogen, a Discount value of 1.0 shall be used in place of 0.8 in the credit availability equation in § 86.098–15(c)(1).

(4) *2003 model year.* Manufacturers selecting Option 1, described in § 86.005–10(f)(1), may not generate or bank early credits under this paragraph (k) for the 2003 model year. Credit generation and banking provisions contained in § 86.004–15 apply for the 2003 model year.

(1) *Credit apportionment.* At the manufacturer's option, credits generated

under the provisions described in paragraph (j) or (k) of this section may be sold to or otherwise provided to another party for use in programs other than the averaging, trading and banking program described in this section.

(1) The manufacturer shall pre-identify two emission levels per engine family for the purposes of credit apportionment. One emission level shall be the FEL and the other shall be the level of the standard that the engine family is required to certify to under § 86.098–10 or § 86.098–11, as applicable. For each engine family, the manufacturer may report engine sales in two categories, “ABT-only credits” and “non-manufacturer-owned credits.”

(i) For engine sales reported as “ABT-only credits”, the credits generated must be used solely in the ABT program described in this section.

(ii) The engine manufacturer may declare a portion of engine sales “non-manufacturer-owned credits” and this portion of the credits generated between the standard and the FEL, based on the calculation in § 86.098–15(c)(1), would belong to another party. For ABT, the manufacturer may not generate any credits for the engine sales reported as “non-manufacturer-owned credits.” Engines reported as “non-manufacturer-owned credits” shall comply with the FEL and the requirements of the ABT program in all other respects.

(2) Only manufacturer-owned credits reported as “ABT-only credits” shall be used in the averaging, trading, and banking provisions described in this section.

(3) Credits shall not be double-counted. Credits used in the ABT program may not be provided to an engine purchaser for use in another program.

(4) Manufacturers shall determine and state the number of engines sold as “ABT-only credits” and “non-manufacturer-owned credits” in the end-of-model year reports required under § 86.098–23.

[65 FR 59944, Oct. 6, 2000]

§ 86.000–16 Prohibition of defeat devices.

Section 86.000–16 includes text that specifies requirements that differ from § 86.094–16. Where a paragraph in